

Amendments to the Claims:

The below listing of claims will replace all prior versions, and listings, of claims in the application. Claim 33 has been amended to correct for formalities including grammatical errors. Claim 38 has been cancelled without prejudice. Claims 40-47 have been added. Support for new claims 40-46 is found, *inter alia*, in the specification on page 7, lines 19-21; page 8, lines 11-14; page 9, lines 3-7; page 11, lines 3-7; and page 12, lines 7-12. No new matter has been added.

Listing of Claims:

Claim 1 (original): A golf ball comprising nanocomposite material, wherein the nanocomposite material comprises a polymer having a structure in which particles of inorganic material are reacted and substantially evenly dispersed, wherein each particle has a largest dimension that is about one micron or less and that is at least an order of magnitude greater than such particle's smallest dimension.

Claim 2 (original): A golf ball as defined in claim 1, wherein the polymer is selected from the group consisting of polyamide, ionomer, polycarbonate, polyurethane, polystyrene, fluoropolymer, polyamide elastomer, polyester elastomer, polyester, polyolefin, thermoplastic elastomer, thermoplastic vulcanizate, and epoxy resin, and mixtures thereof.

Claim 3 (original): A golf ball as defined in claim 1, wherein the particles of inorganic material consist essentially of clay.

Claim 4 (original): A golf ball as defined in claim 3, wherein the clay is selected from the group consisting of hydrotalcite, montmorillonite, micafluoride, and octosilicate.

Claim 5 (original): A golf ball as defined in claim 1, wherein:
the golf ball comprises a core; and
the core comprises nanocomposite material.

Claim 6 (original): A golf ball as defined in claim 5, wherein the core comprises about 1 to about 50 percent by weight nanocomposite material.

Claim 7 (original): A golf ball as defined in claim 6, wherein the core comprises about 1 to about 40 percent by weight nanocomposite material.

Claim 8 (original): A golf ball as defined in claim 7, wherein the core comprises about 5 to about 30 percent by weight nanocomposite material.

Claim 9 (original): A golf ball as defined in claim 1 wherein:
the golf ball comprises a core and a layer surrounding the core; and
the layer comprises nanocomposite material.

Claim 10 (original): A golf ball as defined in claim 9, wherein:
the golf ball comprises a cover layer on an outer surface of the golf ball; and
the cover layer comprises nanocomposite material.

Claim 11 (original): A golf ball as defined in claim 9, wherein:
the golf ball comprises a cover layer on an outer surface of the golf ball and an intermediate layer or layers situated between the core and the cover layer; and
one or more of the intermediate layer or layers comprise nanocomposite material.

Claim 12 (original): A golf ball as defined in claim 9, wherein the layer comprises about 1 to about 50 percent by weight nanocomposite material.

Claim 13 (original): A golf ball as defined in claim 12, wherein the layer comprises about 1 to about 40 percent by weight nanocomposite material.

Claim 14 (original): A golf ball as defined in claim 13, wherein the layer comprises about 5 to about 30 percent by weight nanocomposite material.

Claim 15 (original): A golf ball as defined in claim 1 wherein:
the golf ball comprises a core, a layer of rubber thread encasing the core, and a cover layer encasing the layer of rubber thread; and
the core comprises nanocomposite material.

Claim 16 (original): A golf ball as defined in claim 1 wherein:

the golf ball comprises a core, a layer of rubber thread encasing the core, and a cover layer encasing the layer of rubber thread; and
the cover layer comprises nanocomposite material.

Claim 17 (withdrawn): A golf ball comprising nanofiller material, wherein the nanofiller material consists essentially of particles of inorganic material, wherein each particle has a largest dimension that is about one micron or less and that is at least an order of magnitude greater than such particle's smallest dimension.

Claim 18 (withdrawn): A golf ball as defined in claim 17, wherein the particles of inorganic material consist essentially of clay.

Claim 19 (withdrawn): A golf ball as defined in claim 18, wherein the clay is selected from the group consisting of hydrotalcite, montmorillonite, micafluoride, and octosilicate.

Claim 20 (withdrawn): A golf ball as defined in 17, wherein:
the golf ball comprises a core; and
the core comprises nanofiller material.

Claim 21 (withdrawn): A golf ball as defined in claim 20, wherein the core comprises about 0.1 to about 20 percent by weight nanofiller material.

Claim 22 (withdrawn): A golf ball as defined in claim 21, wherein the core comprises about 0.1 to about 15 percent by weight nanofiller material.

Claim 23 (withdrawn): A golf ball as defined in claim 22, wherein the core comprises about 0.1 to about 10 percent by weight nanofiller material.

Claim 24 (withdrawn): A golf ball as defined in claim 17, wherein:
the golf ball comprises a core and a layer surrounding the core; and
the layer comprises nanofiller material.

Claim 25 (withdrawn): A golf ball as defined in claim 24, wherein:
the golf ball comprises a cover layer on the surface of the golf ball, and;

the cover layer comprises nanofiller material.

Claim 26 (withdrawn): A golf ball as defined in claim 24, wherein:

the golf ball comprises a cover layer on the surface of the golf ball and an intermediate layer or layers between the core and the cover layer; and
one or more of the intermediate layer or layers comprise nanofiller material.

Claim 27 (withdrawn): A golf ball as defined in claim 24, wherein the layer comprises about 0.1 to about 20 percent by weight nanofiller material.

Claim 28 (withdrawn): A golf ball as defined in claim 27, wherein the layer comprises about 0.1 to about 15 percent by weight nanofiller material.

Claim 29 (withdrawn): A golf ball as defined in claim 26, wherein the layer comprises about 0.1 to about 10 percent by weight nanocomposite material.

Claim 30 (withdrawn): A golf ball as defined in claim 17, wherein:

the golf ball comprises a core, a layer of rubber thread encasing the core, and a cover layer encasing the layer of rubber thread; and
the core comprises nanocomposite material.

Claim 31 (withdrawn): A golf ball as defined in claim 17 wherein:

the golf ball comprises a core, a layer of rubber thread encasing the core, and a cover layer encasing the layer of rubber thread; and
the cover layer comprises nanocomposite material.

Claim 32 (original): A golf ball having a core or a layer surrounding the core comprising from about 10 to about 20 percent by weight of nanocomposite material, wherein the nanocomposite material comprises a polyamide in the structure of which phyllosilicate particles are substantially evenly dispersed, wherein each phyllosilicate particle has a largest dimension that is about one micron or less and that is at least an order of magnitude greater than such phyllosilicate particle's smallest dimension.

Claim 33 (original): A golf ball as defined in ~~of~~ claim 32, further comprising an amide block copolymer.

Claim 34 (original): A golf ball as defined in claim 33, wherein the amide block copolymer is a polyether amide block copolymer.

Claim 35 (original): A golf ball as defined in claim 32, further comprising a block copolymer, the block copolymer comprising:

- a first polymer block comprising an aromatic vinyl compound;
- a second polymer block comprising a conjugated diene compound; and
- a hydroxyl group located at a terminal block copolymer.

Claim 36 (original): A golf ball as defined in claim 32, further comprising the hydrogenation product of a block copolymer, comprising:

- a first polymer block comprising an aromatic vinyl compound;
- a second polymer block comprising a conjugated diene compound; and
- a hydroxyl group located at a terminal block copolymer.

Claim 37 (withdrawn): A golf ball comprising nanocomposite material and nanofiller material.

Claim 38 (canceled)

Claim 39 (withdrawn): A method for making a composition for use in golf balls, comprising a step of blending into the composition a nanofiller material, wherein the nanofiller material comprises particles of inorganic material, wherein each particle has a largest dimension that is about one micron or less and that is at least an order of magnitude greater than such particle's smallest dimension.

Claim 40 (new): A golf ball as defined in claim 1, wherein the inorganic material is coated with a compatibilizing agent.

Claim 41 (new): A golf ball as defined in claim 3, wherein the clay is coated with a compatibilizing agent.

Claim 42 (new): A golf ball as defined in claim 1, wherein the inorganic material comprises clay.

Claim 43 (new): A golf ball as defined in claim 1, wherein the golf ball includes:
a cover layer surrounding the core, and
at least one intermediate layer located between the core and the cover layer;
wherein the cover layer comprises a nanocomposite material.

Claim 44 (new): A golf ball as defined in claim 1, wherein the polymer is an ionomer.

Claim 45 (new): A golf ball as defined in claim 1, wherein the polymer is a thermoplastic elastomer.

Claim 46 (new): A golf ball as defined in claim 45, wherein the thermoplastic elastomer is a styrenic block copolymer.